RVT-R Reader Quick Start Guide

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Setting Up the RVT-R Reader

The setup steps for an RVT-R Reader (such as connecting it to a TV) are the same as for the retail Wii. Therefore, please follow the published setup instructions for the Wii.

For customers in the Americas, please visit the Nintendo customer service page: http://www.nintendo.com/consumer/index.jsp. Click the System and Accessory Set Up link. Follow the Basic Setup Steps.

For customers in Europe, please visit http://www.nintendo-europe.com. Choose your language. Click the Support link. Click the Setup & Connect link for the Wii system. Follow the Setup & Connect instructions.

Note 1: Do not use the Wii Remote to place the RVT-R Reader in standby. Use the power button on the RVT-R Reader instead.

Note 2: The published instructions to synchronize your Wii Remote to the Wii also work for the RVT-R Reader, but you must be running the Wii Menu or a game that is expecting input from the Wii Remote.

The RVL-R Writer and RVT-R Discs

In order to create discs that can be run on the RVT-R Reader, you will need to have an RVL-Writer and blank RVT-R discs. You cannot burn RVT-R discs with a PC's DVD writer. You cannot burn .rvm disc images to normal blank DVDs.

Downloading the Writing Software and Instruction Manuals

Please download the RVL_WritingSoftware-20100203.zip package from WarioWorld. Instruction documents are contained in this package as well as the software you will need to create discs for the RVT-R Reader. The RVL_R_UM1.pdf document describes how to set up and use the RVL-R Writer. For more information about how to create discs for the RVT-R Reader please consult RVT_RH_SWUG2.pdf.

Downloading the RVL SDK

The RVL SDK contains the firmware updates for the RVT-R Reader. Download and unzip the latest RVL SDK from WarioWorld. For specific instructions please see the Development Environment Quick Start Guide.

Note that sometimes you need to download two packages: the package containing the base SDK and a separate package containing the latest patches. Unzip the base SDK package first, and then unzip the patch package over the folder that contains the base SDK.

Downloading makeUpdateDisc

Please download the makeUpdateDisc.zip package from WarioWorld. This will enable you to convert .gcm disc images to files to .rvm disc images. An image must be in .rvm format to transfer it to the RVT-R Reader.

Note 1: If you have the RVL SDK and you also have cygwin installed properly for Wii development then you do not have to download makeUpdateDisc.zip. You can just use the "makeupdatedisc" command in a cygwin shell:

makeupdatedisc swupdate_56.21.29_us.gcm swupdate_56.21.29_us.rvm

For information on downloading and installing cygwin, please see the Development Environment Quick Start Guide.

Preparing Game Disc Images

Games need to be mastered into .rvm format before they can be burned onto a disc for the RVT-R Reader. These files can be generated from .dlf files or .gcm files. This guide covers the conversion from .gcm to .rvm. Please see the Mastering Quick Start Guide for instructions on how to master .dlf files to .rvm.

Note 1: It is possible to write .rpf files directly to disc, but this can cause the game to behave in an unpredictable and undesired way. You should always unpack the .rpf file first and master an .rvm.

Starting a Game Disc Image

Simply power on the RVT-R Reader and insert a disc to run it. If you have the Wii Menu installed then you will need to select the Disc Channel and start the program yourself.

Changing the Region Encoding

The RVT-R Reader can be set to run game disc images from the USA, JPN, or EUR region. If the Wii Menu has already been installed on the unit, please follow the instructions listed in this document under "Uninstalling the Wii Menu" before continuing.

1. Insert a GameCube controller into socket 1 and hold down the Z Button.
2. Turn on the RVT-R Reader. The DEVKIT SYSTEM MENU appears.
3. Select DEVKIT settings > Region Code, and change it to the correct region.
4. Press the B Button to return to the main menu.
5. Press the Start Button to save the settings.

For more information on the DEVKIT SYSTEM MENU please see $REVOLUTION_SDK_ROOT\man\en_US\tools\devkitmenu.html. See "Downloading the RVL SDK" above for instructions on obtaining the RVL SDK.

Verifying Installed Firmwares

You can determine which firmwares are currently installed on the unit from the DEVKIT SYSTEM MENU.

1. Insert a GameCube controller into socket 1 and hold down the Z Button.
2. Turn on the RVT-R Reader. The DEVKIT SYSTEM MENU appears.
3. Select Firmware.
4. Use the Control Stick to scroll through the installed firmware versions.

If a disc that you want to run was created with a firmware that is not displayed on this list, then a firmware update is necessary.

Updating the Firmware

1. If you do not have the RVL SDK installed already, please follow the steps in the "Downloading the RVL SDK" section above to do so. The SDK packages contain firmware updater applications. For example, SDK 3.3 contains firmware 56.21.29.
2. If you do not have the RVL_WritingSoftware-20100203.zip package already, please download it from WarioWorld.
3. Verify that you have at least 5 GB of free space on your hard drive.
4. Find the firmware update file in the $REVOLUTION_SDK_ROOT\RVL\bin\tools folder. For example, the file for firmware 56.21.29 is swupdate_56.21.29_us.gcm.
5. Convert the .gcm file into an .rvm. You can do this by either dragging and dropping the .gcm file onto makeUpdateDisc.exe (from the makeUpdateDisc.zip package) or by using the makeupdatedisc command in a cygwin shell (see "Downloading makeUpdateDisc" above).
6. Verify that the resulting .rvm file is 4,800,012,544 bytes in size.
7. Follow the instructions in the RVL-R Writer Manual to burn the .rvm image onto a blank RVT-R disc using rvtwriter.exe (found in the rvtwriter package).
8. Insert the disc into the RVT-R Reader and run it.
9. Wait for the message "SWUpdate Successful" (on the TV) before powering off.

Note 1: This will update the RVT-R Reader with the version of the firmware you selected. However, we recommend that you also run the Firmware All Installer that you can find on WarioWorld (RVL-FirmwareALL_Installer-20081121.zip). This will install older versions of the firmware so you can run tools and programs that were built with older firmwares. You can extract this package over the RVL SDK and follow the above steps with the $REVOLUTION_SDK_ROOT\RVL\bin\tools\swupdate_ALL_us.gcm file.

Installing Wii Menu

The Wii Menu can be installed on the RVT-R Reader to simulate a retail Wii.

1. Download and unzip the Wii Menu Changer from WarioWorld: WiiMenuChanger-20101001.zip.
2. Verify that you have at least 5 GB of free space on your hard drive.
3. Find the Wii Menu Changer .gcm file (wiimenu_changer.gcm) in the WiiMenuChanger folder.
4. Convert the .gcm file into an .rvm. You can do this by either dragging and dropping the .gcm file onto makeUpdateDisc.exe (from the makeUpdateDisc.zip package) or by using the makeupdatedisc command in a cygwin shell (see "Downloading makeUpdateDisc" above).
5. Verify that the resulting .rvm file is 4,800,012,544 bytes in size.
6. Follow the instructions in the RVL-R Writer Manual to burn the .rvm image onto a blank RVT-R disc using rvtwriter.exe (found in the rvtwriter package).
7. Insert the disc into the RVT-R Reader and run it.
8. Select the version and region of the Wii Menu to install and press the HOME button on a connected Wii Remote to begin installation.
9. Wait for the message "Home/Start button is Reboot" (on the TV) to be displayed before either powering off or pressing the HOME button to reset the console.

Uninstalling the Wii Menu

Simply run the Wii Menu Uninstaller channel that is on the Wii Menu. If the uninstaller is accidentally deleted with the Nmenu tool, then you can also run a firmware updater (see above for instructions), which will uninstall the Wii Menu.

Uploading .wad Files

You will need to use the Nmenu tool to upload .wad files to the RVT-R.

1. If you do not have the RVL SDK installed already, please follow the steps in the "Downloading the RVL SDK" section above to do so.
2. If you do not have the RVL_WritingSoftware-20100203.zip package unzipped already, please download it from WarioWorld.
3. Master the RVL_SDK/RVL/bin/Nmenu.elf into an .rvm file. For step by step instructions on how to do this, please see the Mastering Quick Start Guide.
4. Follow the instructions in the RVL-R Writer Manual to burn the .rvm image onto a blank RVT-R disc using rvtwriter.exe (found in the rvtwriter package).
5. Place the .wad file(s) you want to upload on an SD card.
6. Insert the SD card into the SD Card slot on the RVT-R Reader.
7. Run the Nmenu.rvm disc.
8. Follow the on-screen instructions to navigate to the SD menu, and upload the .wad file(s).

9. You can then run the .wad file from Nmenu's list of uploaded .wad files. You can also run them from the Wii menu, where they show up as channels.